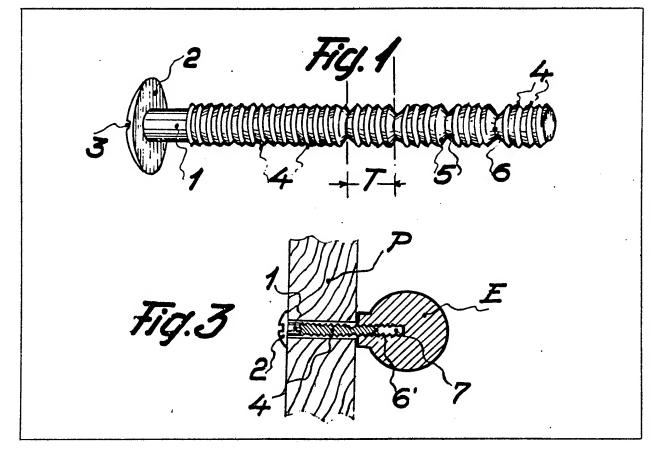
## UK Patent Application (19) GB (11) 2 115 510 A

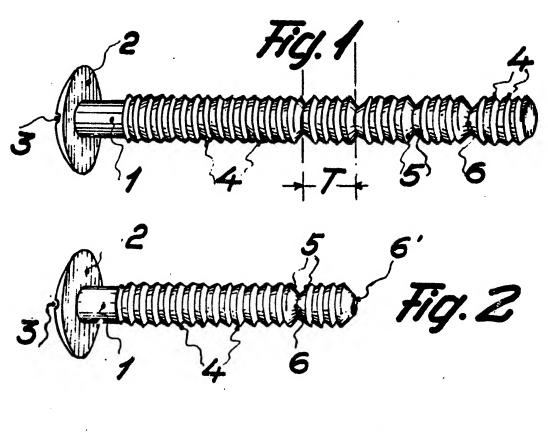
- (21) Application No 8302410
- (22) Date of filing 28 Jan 1983
- (30) Priority data
- (31) 263691
- (32) 12 Feb 1982
- (33) Spain (ES)
- (43) Application published 7 Sep 1983
- (51) INT CL3
  - F16B 35/00
- (52) Domestic classification F2H 11A5 11A6DX 11A6E1 11A6G U1S 1206 1680 F2H
- (56) Documents cited
  - GB 1422692
  - GB 1163580 GB 1126190
  - GB 1076529
  - GB 0834787
  - GB 0550616
- (58) Field of search
- F2H
- (71) Applicant Jose Verges Cases, 43 Ganduxer Street,
  - Barcelona, Spain

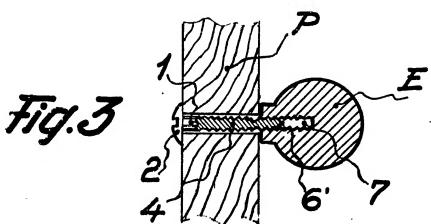
- (72) Inventor
  - Jose Verges Cases
- (74) Agent and/or Address for Service
  - Fitzpatricks,
  - 48 St. Vincent Street,
  - Glasgow G2 5TT

- (54) Screw shortenable without damaging the thread
- (57) A screw provided with a threaded shank 1 interrupted at spaced intervals T by successive grooves 5 which define weak areas along the stud 1 for enabling a cut to be made to shorten the screw to a required length without damaging the thread.



G





45

## **SPECIFICATION**

## A screw which can be shortened to a required length without damaging the thread

The present invention relates to a screw which 5 can be shortened without damaging the thread.

It is particularly but not exclusively envisaged that the screw will be used to fix handles, knobs and other furniture accessories to surfaces of different thicknesses, however the screw has 10 many other applications.

Generally, when a conventional screw is cut to a required length, by a bandsaw, hacksaw or other cutting implement, the end of the screw thread is damaged. As a result, the ragged end will not enter the screw nut or any other fastening device with an internal thread.

It is an object of the present invention to provide an easily adjustable screw which disposes of the need to have several sets of screws with different lengths.

The invention accordingly provides a screw which can be shortened to a required length without damaging the thread, comprising a head and a threaded stud having a succession of spaced transverse slits, grooves or notches, said slits defining weakened areas disposed along the length of the stud for enabling a cut to be made to reduce the total length of the screw to that required for a specific application without damaging the first remaining threads of the screw.

Preferably the slits are formed by converging conical sections which define the weakened areas of the stud.

An embodiment of the present invention will now be described by way of example with reference to the accompanying drawings, in which:—

Figure 1 is a perspective view of the screw showing the transverse slits;

40 Figure 2 is a perspective view of the screw which has been shortened by a cut made through one of the transverse slits; and

Figure 3 shows a sectional view of the screw being used to fasten a furniture knob.

The screw of the present invention comprises a stud 1 and a head 2 having either a flat or convex

face provided with one or more grooves 3 for engagement with a screwdriver. The stud 1 is provided with a thread 4, the helical pitch of which varies according to the specific application of the screw. The thread 4 is interrupted at regular intervals T by successive grooves, slits or notches made along the stud 1 as shown in Figure 1. The slits define weak areas 5 along the stud 1. In order

55 to reduce the length of the stud 1, a transverse cut is made at the required slit, as shown in Figure 2, by any suitable method. The first threads 4 of the screw are left undamaged enabling the screw to enter a nut or threaded opening of an accessory.

60 The sectional view of Figure 3 shows a specific function of the screw whose threaded stud 1 has been reduced to a length required for passing through a furniture piece P and receiving a spherical knob E which is provided with a threaded

65 cavity 7. The screw may also be used to securely fasten other accessories to a door or drawer of any furniture piece. The size of the screw, determined by its length, diameter, thread pitch, shape and size of its head, and the type of metal used for its

70 manufacture may vary providing its condition necessary for an unfixed number of slits made along its length does not alter.

## **CLAIMS**

- 1. A screw which can be shortened to a
  required length without damaging the thread, comprising a head and a threaded stud having a succession of spaced transverse slits, grooves or notches, said slits defining weakened areas disposed along the length of the stud for enabling a cut to be made to reduce the total length of the
- screw to that required for a specific application without damaging the first remaining threads of the screw.
- A screw according to claim 1, wherein the
  slits are formed by converging conical sections which define the weakened areas of the stud.
  - A screw according to claim 1 or claim 2, in which the slits are spaced at regular intervals.
- A screw substantially as hereinbefore
  described with reference to the accompanying drawings.